

ABSTRACT OF THE DISCLOSURE

A sputtering method of depositing a titanium nitride film on a titanium film in contact with a silicon at a bottom of a contact hole is provided, wherein the sputtering method is carried out at a temperature of the silicon region of not less than 450°C, so that the titanium nitride film has a compressive stress of not higher than 5×10^9 dyne/cm² whereby the titanium film has such a high stability as preventing any crack upon changing the compressive stress to a tensile stress by a heat treatment.